

INTERNATIONAL SEARCH REPORT

International Application No
PCT/EP2004/006424

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 A23L1/212 A23L1/064 A23B7/005

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 A23L A23B

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the International search (name of data base and, where practical, search terms used)

EPO-Internal, WPI Data, PAJ, FSTA, BIOSIS

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	<p>DATABASE FSTA 'Online! INTERNATIONAL FOOD INFORMATION SERVICE (IFIS), FRANKFURT/MAIN, DE; KARIM M A ET AL: "Effect of heat processing on the quality of canned mango pulp." XP002262296 Database accession no. 72-2-04-j0564 abstract & PAKISTAN JOURNAL OF SCIENTIFIC RESEARCH 1970 DEPT. OF FOOD TECH., AGRIC. UNIV., LYALLPUR, W. PAKISTAN, vol. 22, no. 1/2, 1970, pages 44-50, ----- -/--</p>	1-8, 25

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

* Special categories of cited documents:

- *A* document defining the general state of the art which is not considered to be of particular relevance
- *E* earlier document but published on or after the international filing date
- *L* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- *O* document referring to an oral disclosure, use, exhibition or other means
- *P* document published prior to the international filing date but later than the priority date claimed

- *T* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- *X* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- *Y* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art
- *&* document member of the same patent family

Date of the actual completion of the international search

2 November 2004

Date of mailing of the international search report

17/11/2004

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Krajewski, D

INTERNATIONAL SEARCH REPORT

International Application No
PCT/EP2004/006424

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DATABASE FSTA 'Online! INTERNATIONAL FOOD INFORMATION SERVICE (IFIS), FRANKFURT/MAIN, DE; CARVALLO P M S ET AL: "Formulation of an avocado paste product." XP002262297 Database accession no. 84-2-09-j1551	1-8,13, 25
A	abstract & ALIMENTOS FAC. DE INGENIERIA, GENERAL CRUZ NO. 34, VALPARAISO, CHILE, vol. 8, no. 4, 1983, pages 9-14,	21,22
X	US 5 298 275 A (BALASINGHAM AMARANATHAN ET AL) 29 March 1994 (1994-03-29) column 3, line 39 - column 4, line 58 column 6, line 54 - column 7, line 60 column 11, line 45 - column 12, line 21 examples 1-3 claims 1,10,13,17	1-8,13, 25 20,22-24
X	US 5 871 794 A (BRITO JORGE ISSAC) 16 February 1999 (1999-02-16) cited in the application	1-8,13, 25
A	the whole document	9-11,16, 18-23
X	DE 11 01 118 B (HANS ADALBERT SCHWEIGART DR) 2 March 1961 (1961-03-02)	1,2, 4-13,16, 18,19,25 21-24
A	the whole document	
X	DATABASE FSTA 'Online! INTERNATIONAL FOOD INFORMATION SERVICE (IFIS), FRANKFURT/MAIN, DE; MARTIN Z DE ET AL: "Industrial production of guava pulp, red variety." XP002262298 Database accession no. 76-1-05-j0655 abstract & COLETANEA DO INSTITUTO DE TECNOLOGIA DE ALIMENTOS, vol. 6, no. 1, 1975, pages 11-36,	1,2,4-8, 13,25
X	DATABASE FSTA 'Online! INTERNATIONAL FOOD INFORMATION SERVICE (IFIS), FRANKFURT/MAIN, DE; RODRIGUEZ A J ET AL: "Evaluation of papaya nectar prepared from unpeeled papaya puree." XP002262299 Database accession no. 72-2-10-j1593	1,2,4-8, 13,25
A	abstract -/--	20,22-24

INTERNATIONAL SEARCH REPORT

International Application No
PCT/EP2004/006424

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
	& JOURNAL OF AGRICULTURE OF THE UNIVERSITY OF PUERTO RICO FOOD TECH. LAB., AGRIC. EXPT. STA., MAYAGÜEZ CAMPUS, UNIV. OF PUERTO RICO, USA, vol. 56, no. 1, 1972, pages 79-80, -----	
X	US 5 900 267 A (MONROS SALVADOR CORET) 4 May 1999 (1999-05-04)	1,2, 4-13, 16-19,25 21-24
A	the whole document -----	
X	US 2002/197385 A1 (TOVES FRANCES ANN) 26 December 2002 (2002-12-26)	1-13, 16-19, 21-25
	paragraph '0010! - paragraph '0016! paragraph '0029! paragraph '0033! - paragraph '0044! examples 1,2 claims 1,3,4,6-8,15-18 -----	
X	FR 2 621 224 A (DESJONQUERES OLIVIER) 7 April 1989 (1989-04-07) the whole document -----	1-8,25
X	EP 0 850 572 A (BERTOCCHI ALESSANDRO) 1 July 1998 (1998-07-01)	1,4-8,25
A	column 1, line 3 - line 38 column 3, line 26 - column 5, line 20 claim 1 -----	21-24
X	EP 0 429 966 A (MEIDI YA FOOD FACTORY) 5 June 1991 (1991-06-05)	1,2, 4-11,13, 16,18, 19,25
	the whole document -----	
X	US 4 139 647 A (DOUGLAS GEORGE) 13 February 1979 (1979-02-13)	1,2, 4-18, 21-25
	column 2, line 8 - column 3, line 26 claims 1,2 -----	
A	US 2002/068125 A1 (TAN MAY CHU ET AL) 6 June 2002 (2002-06-06) the whole document -----	1-8,20, 22-25
X	FR 2 294 649 A (GERBER PROD) 16 July 1976 (1976-07-16)	9-11,13, 17-19,25
A	page 1, line 1 - line 7 examples 2,3 claim 1 -----	7,21-23
	----- -/-	

INTERNATIONAL SEARCH REPORT

International Application No
PCT/EP2004/006424

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X A	US 4 413 017 A (LOADER MARY A) 1 November 1983 (1983-11-01) column 3, line 49 - column 4, line 65 column 7, line 53 - column 9, line 39 example 1 claims 1,2,6-13	1,2,6-8, 21-25 9-13, 17-19
X A A	US 5 879 737 A (ASHOURIAN JAMSHID) 9 March 1999 (1999-03-09) column 2, line 45 - column 5, line 10 examples 1,2,5 tables 1,2 claims 1,2,8-10 DATABASE FSTA 'Online! INTERNATIONAL FOOD INFORMATION SERVICE (IFIS), FRANKFURT/MAIN, DE; WILLS R B H ET AL: "Storage of two new cultivars of guava fruit for processing." XP002262300 Database accession no. 83-3-12-j1934 abstract & TROPICAL AGRICULTURE SCHOOL OF FOOD TECH., UNIV. OF NEW SOUTH WALES, PO BOX 1, KENSINGTON, NSW 2033, AUSTRALIA, vol. 60, no. 3, 1983, pages 175-178, DATABASE BIOSIS 'Online! BIOSCIENCES INFORMATION SERVICE, PHILADELPHIA, PA, US; 1987, SEYMOUR G B ET AL: "INHIBITION OF DEGREENING IN THE PEEL OF BANANAS RIPENED AT TROPICAL TEMPERATURES I. EFFECT OF HIGH TEMPERATURE ON CHANGES IN THE PULP AND PEEL DURING RIPENING" XP002262301 Database accession no. PREV198784003621 abstract & ANNALS OF APPLIED BIOLOGY, vol. 110, no. 1, 1987, pages 145-152, ISSN: 0003-4746	9-11,13, 16-19,25 21-24 4,20, 22-24 4,20,22
P,X	WO 2004/037017 A (UNILEVER PLC ; LEVER HINDUSTAN LTD (IN); UNILEVER NV (NL)) 6 May 2004 (2004-05-06) the whole document	1-25

INTERNATIONAL SEARCH REPORT

International application No.
PCT/EP2004/006424

Box II Observations where certain claims were found unsearchable (Continuation of item 2 of first sheet)

This International Search Report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☐ Claims Nos.:
because they relate to subject matter not required to be searched by this Authority, namely:
2. ☐ Claims Nos.:
because they relate to parts of the International Application that do not comply with the prescribed requirements to such an extent that no meaningful International Search can be carried out, specifically:
3. ☐ Claims Nos.:
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

Box III Observations where unity of invention is lacking (Continuation of item 3 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

see additional sheet

1. ☐ As all required additional search fees were timely paid by the applicant, this International Search Report covers all searchable claims.
2. ☒ As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.
3. ☐ As only some of the required additional search fees were timely paid by the applicant, this International Search Report covers only those claims for which fees were paid, specifically claims Nos.:
4. ☐ No required additional search fees were timely paid by the applicant. Consequently, this International Search Report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:

Remark on Protest

- ☐ The additional search fees were accompanied by the applicant's protest.
- ☐ No protest accompanied the payment of additional search fees.

FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

This International Searching Authority found multiple (groups of) inventions in this international application, as follows:

1. claims: 1-8, 13 (part), 20, 22(part), 23(part), 25(part)

Stabilized fruit pulp and method for making a stabilized fruit pulp composition

2. claims: 9-12, 13(part), 14-19, 21, 22(part), 23(part), 25(part)

Stable puree composition method for making a stabilised fruit puree composition

Common features between independent claims 1, 9, 20, 21 and 25 is a fruit pulp comprising chunks, said chunks having dimensions from about 1x1x1 mm to about 15x15x15 mm.

These dimensions are common to almost all fruit pulp compositions and are therefore unsuitable for defining an inventive concept, since these technical features in combination are not special, considering that they do not define any contribution over the prior art.

Independent claim 1 relates to a stabilized fruit pulp composition, claim 20 to a method for making a stabilized fruit pulp composition and claim 25 to a product produced by said method. The feature in common is a heating step of less than 90° min for less than 4 min. This short time pasteurization step does also not define any contribution over the prior art (see eg US2002/197385).

Independent claim 9 relates to a stable puree composition, claim 21 to a method for making a stabilised fruit puree composition and claim 25 to a product produced by the process of claim 21. The additional feature in common is the presence of a thickening base. A pulp comprising a thickening base is already known in the art and thus does not define any contribution over the prior art (see US2002/197385).

Please note that all inventions mentioned under groups 1 and 2, although not necessarily linked by a common inventive concept, could be searched without effort justifying an additional fee.

As set out above, there is no technical relationship between special technical features in the sense of R. 13 PCT and claims 1, 9, 20, 21 and 25 define different inventions.

The groups of inventions are therefore:

Group 1.1 (Claims 1-8, 13(part))

Group 1.2 (Claim 20, 22(part), 23(part), 25(part))

Group 2.1 (Claims 9-13(part), 14-19)

Group 2.2 (Claims 21, 22(part), 23(part), 25(part))

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/EP2004/006424

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
US 5298275	A	29-03-1994	NZ 235972 A	27-04-1995
			US 5500241 A	19-03-1996
			AT 135890 T	15-04-1996
			AU 659415 B2	18-05-1995
			AU 8704491 A	14-05-1992
			CA 2055069 A1	07-05-1992
			DE 69118317 D1	02-05-1996
			DE 69118317 T2	10-10-1996
			EP 0485193 A1	13-05-1992
			ES 2087257 T3	16-07-1996
			JP 6090722 A	05-04-1994
US 5871794	A	16-02-1999	NONE	
DE 1101118	B	02-03-1961	NONE	
US 5900267	A	04-05-1999	ES 2111500 A1	01-03-1998
			AT 214553 T	15-04-2002
			CA 2213597 A1	22-02-1998
			DE 69711132 D1	25-04-2002
			DE 69711132 T2	14-11-2002
			DK 824871 T3	15-07-2002
			EP 0824871 A2	25-02-1998
			PT 824871 T	30-09-2002
US 2002197385	A1	26-12-2002	CA 2443810 A1	19-09-2002
			EP 1377179 A1	07-01-2004
			JP 2004519240 T	02-07-2004
			WO 02071871 A1	19-09-2002
			US 2004161522 A1	19-08-2004
FR 2621224	A	07-04-1989	FR 2621224 A1	07-04-1989
EP 0850572	A	01-07-1998	IT PR960056 A1	23-06-1998
			AT 235169 T	15-04-2003
			DE 69720159 D1	30-04-2003
			DE 69720159 T2	18-12-2003
			EP 0850572 A2	01-07-1998
			ES 2196293 T3	16-12-2003
			US 5993876 A	30-11-1999
EP 0429966	A	05-06-1991	JP 2945070 B2	06-09-1999
			JP 4004857 A	09-01-1992
			JP 2927888 B2	28-07-1999
			JP 3219844 A	27-09-1991
			CA 2030003 A1	18-05-1991
			EP 0429966 A2	05-06-1991
			US 5075124 A	24-12-1991
US 4139647	A	13-02-1979	NONE	
US 2002068125	A1	06-06-2002	AU 9181701 A	08-04-2002
			BR 0114222 A	09-12-2003
			WO 0226052 A1	04-04-2002
			EP 1322181 A1	02-07-2003
FR 2294649	A	16-07-1976	FR 2294649 A1	16-07-1976

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/EP2004/006424

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
US 4413017	A	01-11-1983	AU 545270 B2	04-07-1985
			AU 8471682 A	16-12-1982
			CA 1175711 A1	09-10-1984
			JP 58000868 A	06-01-1983
US 5879737	A	09-03-1999	US 5849350 A	15-12-1998
			AU 728039 B2	04-01-2001
			AU 6687996 A	05-03-1997
			EP 0845952 A1	10-06-1998
			IL 123767 A	13-08-2000
			IN 186435 A1	01-09-2001
			NZ 315219 A	29-11-1999
			TW 429137 B	11-04-2001
			WO 9705787 A1	20-02-1997
WO 2004037017	A	06-05-2004	US 2004081741 A1	29-04-2004
			WO 2004037017 A1	06-05-2004
			US 2004081742 A1	29-04-2004